

International Participation in NASA Programs

NASA's Magnetospheric Multiscale Mission

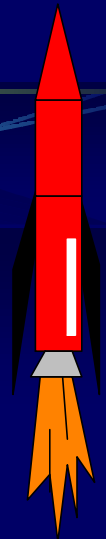
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and NASA Export Control Administrator

NASA Headquarters
Washington, DC

International Participation in NASA Programs

In principle, NASA welcomes it...
however, *don't plan on using NASA
money to purchase a foreign launch
or to pay for foreign research*



International Participation in NASA Programs

- . . . And, if you are considering involving one of the following in a proposal to NASA, forget it:
 - IRAN 
 - IRAQ 
 - CUBA 
 - NORTH KOREA 
 - LIBYA 
 - and a few others on the ITAR 126.1 List . . .
- . . . And if you are thinking of involving organizations or individuals on the **Entities List**, **Specially Designated Nationals List**, **Debarred Parties List**, or **Denied Persons List**, . . . **we won't like it**
- **And you might also be interested in knowing about the . . .**

International Participation in NASA Programs

● U.S. Non-Proliferation and Export Control Policy

- *The United States will continue to oppose missile programs of proliferation concern, and **will exercise particular restraint in missile-related cooperation.** We will continue to retain a strong presumption of denial against exports to any country of complete space launch vehicles or major components.*

The United States will not support the development or acquisition of space-launch vehicles in countries outside the MTCR.

For MTCR member countries, we will not encourage new space launch vehicle programs, which raise questions on both nonproliferation and economic viability grounds. The United States will, however, consider exports of MTCR-controlled items to MTCR member countries for peaceful space launch programs on a case-by-case basis . . .

- ***And . . .if you're proposal has anything to do with the International Space Station...***



International Participation in NASA Programs



● P.L. 106-178 – Iran Non-Proliferation Act

● SEC. 6. RESTRICTION ON EXTRAORDINARY PAYMENTS IN CONNECTION WITH THE **INTERNATIONAL SPACE STATION**

- *No agency of the U.S. Government may make extraordinary payments in connection with the **International Space Station** to the Russian Aviation and Space Agency, any organization or entity under the jurisdiction or control of the Russian Aviation and Space Agency, or any other organization, entity, or element of the Government of the Russian Federation, unless the President has made and reported to the Congress a determination that the Government of the Russian Federation is preventing transfer to Iran of items that would make a material contribution to WMD or missiles.*

And . . .

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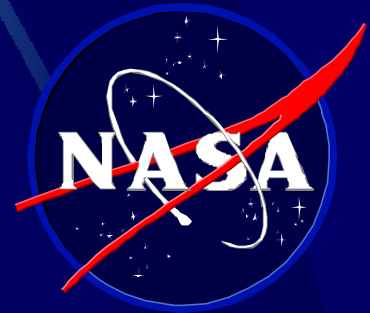


● ...if you are contemplating any *China (PRC) involvement* ...

- Section 126(b) of P.L. 106-391 (NASA Authorization Act of 2000) requires the NASA Administrator to **certify to the Congress at least 15 days in advance of any cooperative agreement with the PRC**, or any company owned by the PRC or incorporated under the laws of the PRC, involving spacecraft, spacecraft systems, launch systems, or scientific or technical information that –
 - (A) **the agreement is not detrimental to the U.S. space launch industry; and**
 - (B) **the agreement, including any indirect technical benefit that could be derived from the agreement, will not improve the missile or space launch capabilities of the PRC.**

International Participation in NASA Programs

- In case you may have forgotten, *in principle*, NASA welcomes international participation in our programs . . . really!



International Participation in NASA Programs

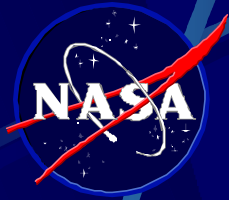


● On top of all that, did you know...

- *Congress passed a law that requires NASA to notify the public about certain international cooperative activities at least 45 days prior to finalizing the arrangement?**
- *They did, and while it probably won't, it could affect the implementation of a program in which you have submitted a proposal*

* Section 126(a) of Public Law 106-391 (NASA Authorization Act of 2000), notification for space missions in which a foreign entity supplies the spacecraft, spacecraft system, or launch system

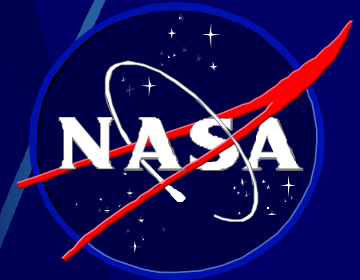
NASA's Export Control Program (ECP)

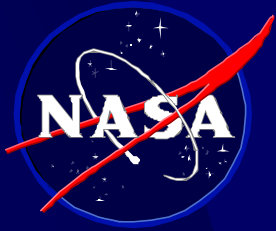


- ❑ First published in 1995; NASA Policy Directive 2190.1 issued last spring; new NASA Procedures & Guidelines 2190 in concurrence
- ❑ Centralized Export Policy & Compliance in Single Office at NASA Headquarters
- ❑ Export Administrators and Counsel named at each Field Center – resident “experts” on export laws/regulations
- ❑ Assigns Export Responsibilities to NASA Program/Project Managers & Standardizes Agency Procedures

The EAR & ITAR in Civil Space Activities

- Export Control and Civil Space ?
– *Not An Oxymoron!*
- Both the International Traffic in Arms Regulations (ITAR) and the Export Administration Regulations (EAR) apply
- Controls exist on technology (technical data and software), hardware, and training/assistance – even if all of the information is in the public domain





The EAR in Civil Space

- ECCN 9A004 – covers the International Space Station,* *not necessarily the payloads and experiments that permanently or temporarily occupy it*
- “Space Qualified” parts
- Materials, Electronics, Computers, Sensors & Lasers, Navigation & Avionics, Propulsion Systems

* Note: technical data required for the detailed design, development, manufacturing or production of the ISS remains under the control of the ITAR – Category XV(f)

The ITAR in Civil Space

● What's covered?

USML Category XV – Spacecraft Systems & Associated Equipment

- All satellites, except the International Space Station, including:
 - *Scientific, Research, & Experimental (terms added in 1999)*
 - Communications, Navigation, Multi-mission, & Remote Sensing (not just Earth remote sensors)
- Certain GPS receiving equipment
- Certain radiation-hardened microcircuits
- All specifically designed or modified systems, components, parts, accessories, & associated equipment, including satellite fuel, ground support equipment, test equipment, payload adapter or interface hardware, replacement parts, & non-embedded solid propellant orbit transfer engines
- All *technical data* and *defense services* directly related to the above, including *detailed design, development, manufacturing or production data* for all spacecraft and specifically designed or modified components

The ITAR in Civil Space

- **What's covered?**

USML Category XII

- Optical and Guidance & Control Equipment, etc.

USML Category IV

- Launch Vehicles, etc.

Certain MTCR Annex Items (22 CFR 121.16)

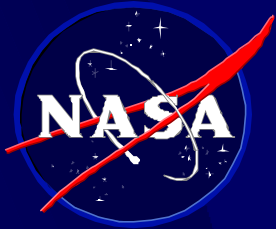
- **So, what about “scientific instruments” for “scientific or research” satellites?**

- Unless there is a confirmation that the instrument is under the jurisdiction of the Department of Commerce, it is subject to the ITAR
 - e.g., there are instances of scientific instruments for satellites being declared subject to the jurisdiction of the Department of Commerce
 - Also, DOE obtained confirmation that the Alpha Magnetic Spectrometer (AMS), to be flown on the Space Shuttle & attached to the ISS, is subject to the jurisdiction of the Commerce Department

The ITAR in Civil Space

● **ITAR Defense Service Exemptions**

- Except for the new University exemption, a DOD bid proposal exemption, and the Canadian exemption, don't bother looking for "defense service" exemptions
- And be mindful that a Technical Assistance Agreement is required even if assistance on a defense article involves 100% public domain information
- NASA is working to change this for NASA programs



NASA Contractors and Export Control

- **NFS Clause 1852.225-70 “Export Licenses” – required in all domestic contracts**
- **Contractors have responsibility to obtain any required licenses unless otherwise agreed with NASA**
- **NASA Procedures & Guidelines (NPG) 2190 requires export plans and reporting for exports effected in support of NASA programs**

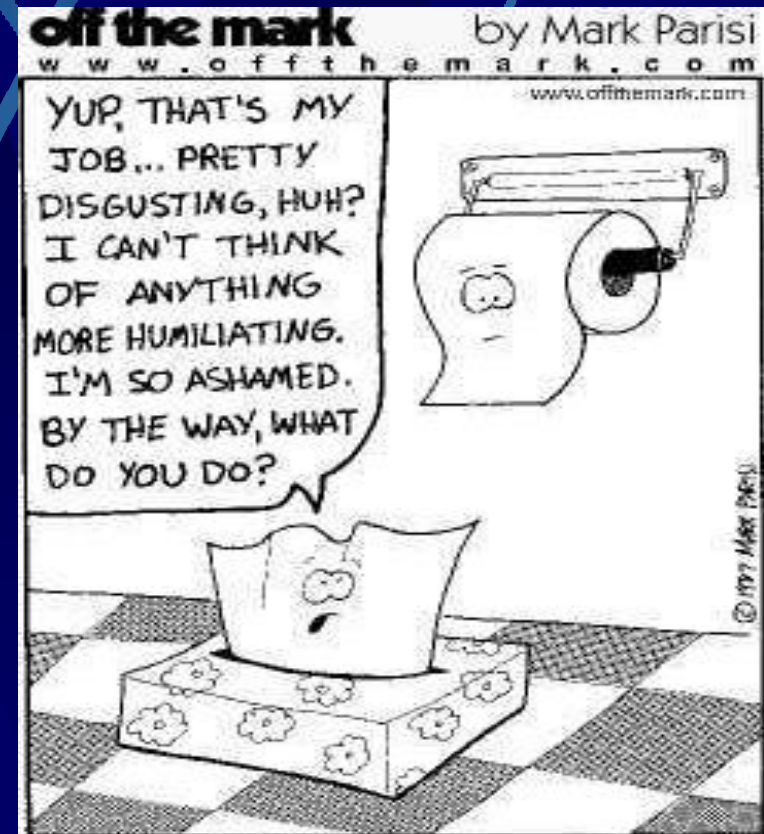
NASA Contractors and Export Control

- The Department of State and, more recently, the Department of Commerce staff license applications to NASA for review
- If you are (or will be) a NASA contractor, it is in your interest to coordinate with NASA in advance any license application that you intend to submit and which will further a NASA program
 - NASA might have useful input in framing the application and can advocate for its timely approval
 - Seeing applications after the fact can result in delays, and if not to our liking or not framed correctly, an RWA

For More Information . . .



- ❖ **Your Center Export Administrator or Export Counsel, listed at:**
<http://www.hq.nasa.gov/office/codei/nasaecp>
- ❖ **NASA Headquarters Export Control Officials, John Hall or Paula Geisz: 202-358-0330 or**
<http://www.hq.nasa.gov/office/codei/nasaecp>
- ❖ **NPD 2190.1: NASA Export Control Program**
- ❖ **NPD 2110.1: Foreign Access to NASA Technology Utilization Material**



*A NASA Export Control Officer
hears a Program Officer's lament*